STATE OF UTAH GENERAL OUTLOOK
Jan 1, 2005

SUMMARY
Water year 2005 has distinct similarities to the beginning of water year 2004 as well as some distinct differences. Last year had some phenomenal storms that jump started the snowpacks across the state and the same is true for this year. In northern Utah on the Bear, Weber and Provo watersheds, current snowpacks (110% to 140%) are a mirror image of last year and that is pretty much where the similarity ends. The Uintah basin and North Slope snowpacks are at 177% of normal, about 50% more than last year. The Uintah basin currently has 6 sites that have over 200% of average snowpack. This area has a 97% probability of at least average snowpack by April 1 and a significant probability of snowpacks greater than 130%. Further south, the Sevier River (172%) and most of southern Utah (246%) have very impressive snowpacks. The Sevier has an 85% probability of at least average snowpack by April 1 and southwestern Utah has an 88% probability. Given average snowpack accumulation over the remainder of winter, these areas will be between 130 and 160% of average on April 1. Both of these areas have current snowpacks similar to the snowpack of 1983 which continued to build through the winter and ended up producing serious flooding across the state. At this point, it is far too early to predict the outcome of this year's snowpack, but if it follows a maximum type pattern, the Sevier and southern Utah could end up with snowpacks ranging from 200% to 300% of normal. The smallest snowpack in the state is in central Utah, in the San Pitch valley which is near average at 103%. Precipitation for December was near average for most of the state except southern Utah which had about 150% of normal, bringing seasonal precipitation, (Oct-Dec) to 153%. Soil moisture was substantially recharged from large precipitation events in late fall and early winter. Current soil moisture across the entire state is only about 10% to 15% less than what it was during active snowmelt of last spring. Estimates of soil moisture range from about 50% to 70% of saturation in the upper 24 inches of soil. Low reservoir storage is also a concern with total reservoir storage at 38% of capacity, the same as last year. The area of greatest drought concern is the Bear River with current reservoir storage at of 2% of capacity. Areas that could have high streamflows include the upper Sevier and the Virgin. Streamflow forecasts range from 50% to 150% of average. Surface Water Supply Indices range from 4% on the Bear River, to 82% on the Virgin.

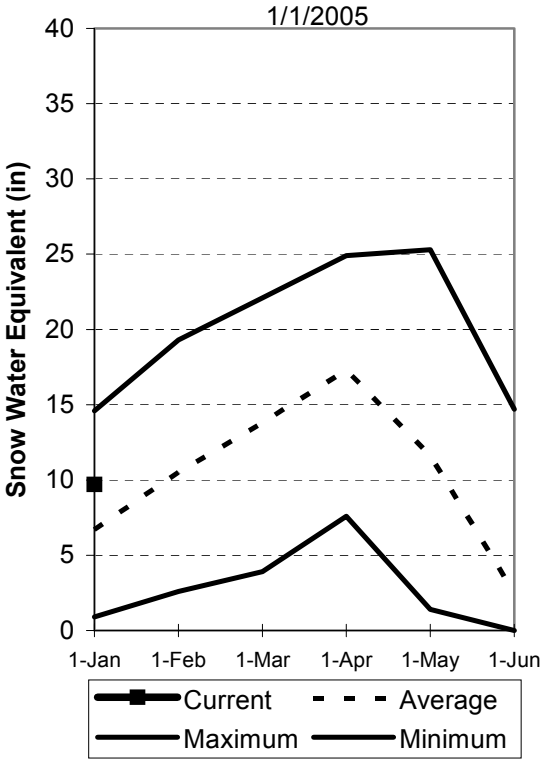
SNOWPACK
January first snowpacks as measured by the NRCS SNOTEL system range from 112% on the Bear to 246% in southwestern Utah. Most areas in northern Utah are comparable to last year, whereas the Uintah Basin and everything south of Salina have substantially greater snowpacks. The Midway Valley SNOTEL site currently has 36 inches of snow water equivalent and its April 1 average peak is only 27 inches. Of some concern are low elevation snowpacks across the state, which are below average. Any outcome is still possible, even in southern Utah, but there is a high probability that the upper Sevier, the Virgin and the Uintah Basin will have at least average snowpacks on April 1 and realistically could be 130% or greater.

PRECIPITATION
Mountain precipitation during December was near average over much of Utah (100%-125%). In southern Utah, precipitation was 150% of average. This brings the seasonal accumulation (Oct-Dec) to 153% of average statewide.

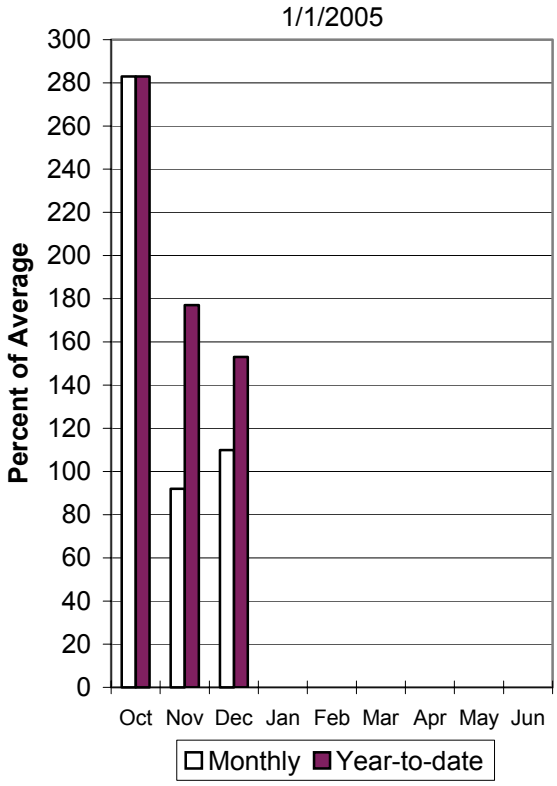
RESERVOIRS
Storage in 41 of Utah's key irrigation reservoirs is at 38% of capacity. This is the same as last year and reflects heavy use of reservoir storage to make up the streamflow deficit during years of drought. Most reservoir operators are utilizing a conservative strategy, storing as much water as possible.

STREAMFLOW
Snowmelt streamflows are expected to be below average to well above average across the state of Utah this year. Forecast streamflows range from 51% on the Bear at Stewart dam to 238% on Coal Creek near Cedar City. Most flows are forecast to be in the 80% to 120% range. Overall water supply conditions are improving.

Mountain Snowpack



Precipitation



Statewide Reservoir Storage